

IWSOS 2013

7th International Workshop on Self-Organizing Systems

<http://ifisc.uib-csic.es/iwsos2013>

Palma de Mallorca, Spain 9-10th May 2013

Technical co-sponsors: IFIP TC6 WG6.2, EU FP7 NoE on Internet Science (EINS)

Paper submission is open: <https://edas.info/newPaper.php?c=13239>

Paper Submission Deadline: Extended to January 18, 2013.

Scope:

The main themes of IWSOS 2013 are from the fields of techno-social systems and networks-of-networks with their unique and complex blend of cognitive, social, and technological aspects. We will analyse how these systems self-organize, acquire their structure, and evolve. Thus, we aim to advance our understanding of such key infrastructures in our societies and, more generally, of these sorts of self-organizational processes in nature.

We are further interested in learning how to engineer such self-organizing networked systems to have desirable properties including dependability, predictability, and resilience in the face of the inevitable challenges that they face.

Building on the success of its predecessors, this multi-disciplinary workshop aims to bring together leading international researchers from complex systems, distributed systems, and communication networks to create a visionary forum for discussing the future of self-organization in networked systems. We invite the submission of manuscripts that present original research results on the themes of self-organization in techno-social systems and networks-of-networks.

Key Topics:

The workshop scope includes, but is not limited to, the following topical areas of self-organizing systems:

- Design and analysis of self-organizing and self-managing systems
- Inspiring models of self-organization in nature and society
- Structure, characteristics, and dynamics of self-organizing networks
- Self-organization in techno-social systems

- Self-organized social computation
- Self-organized communication systems
- Citizen Science
- Techniques and tools for modelling self-organizing systems
- Tools to quantify self-organization
- Control and control parameters of self-organizing systems
- Phase transitions in self-organizing systems
- Robustness and adaptation in self-organizing systems
- Self-organization in complex networks such as peer-to-peer, sensor, ad-hoc, vehicular, and social networks
- Self-organization in socio-economic systems
- User and operator-related aspects of man-made self-organizing systems
- Self-organizing multi-service networks and multi-network services
- Methods for configuration and management of large, complex networks
- Self-protection, self-configuration, diagnosis, and healing
- Self-organizing group and pattern formation
- Self-organizing mechanisms for task allocation, coordination and resource allocation
- Self-organizing information dissemination and content search
- Security and safety in self-organizing networked systems
- Risks and limits of self-organization
- The human in the loop of self-organizing networks
- Social, cognitive, and semantic aspects of self-organization
- Evolutionary principles of the (future, emerging) Internet
- Decentralized power management in the smart grid

Important dates:

- **Extended Submission Deadline: January 18, 2013**
- Notification of acceptance: February 17, 2013
- Camera-ready papers due: February 24, 2013
- Conference dates: May 9 – 10, 2013

Papers:

IWSOS 2013 invites the submission of manuscripts that present original research results which have not been previously published and are not currently under review by another conference or journal. Any previous or simultaneous publication of related material should be explicitly noted in the submission. All papers must be submitted in PDF format. Submissions will be peer reviewed by at least three members of the international technical program committee and judged on originality, significance, clarity, relevance, and correctness.

The Springer “LNCS Proceedings” style should be used for submission. Templates for LaTeX and Word are available at <http://tiny.cc/qiohy>.

Full papers should describe original research results. Submissions should be full-length papers up to 12 pages using the LNCS style (including figures, references, and a short abstract).

Short Papers should be position papers, challenging papers, and papers presenting first results. Short papers are up to 6 pages using the LNCS style (including figures, references, and a short abstract).

Proceedings:

The proceedings will be published by Springer-Verlag in their Lecture Notes in Computer Science (LNCS) series. At least one of the authors of each accepted paper must attend IWSOS 2013 to present the paper.

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